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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/539,019	06/16/2006	Mikael Gisslegard	1510-1107	7395

466 7590 09/24/2010
YOUNG & THOMPSON
209 Madison Street
Suite 500
Alexandria, VA 22314

EXAMINER

NGUYEN, TRINH T

ART UNIT	PAPER NUMBER
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3644

NOTIFICATION DATE	DELIVERY MODE
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09/24/2010

ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

DocketingDept@young-thompson.com

DETAILED ACTION

1. Applicant's arguments filed on 8/26/10, with respect to the Examiner's rejection dated 5/27/10, have been fully considered and are persuasive. Therefore, the rejection has been withdrawn. However, upon further consideration, a new ground(s) of rejection is made as follows.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. Claims 1,3-12,17-22,28-31 are rejected under 35 U.S.C. 103(a) as being unpatentable over Mills (US 4572106) in view of Alveby (WO 00/76298).

For claims 1,6, and 21, Mills discloses a milking device comprising:

a head portion (2);

a sleeve (11), and

a separate milk tube (10), connectable with the sleeve adapted to be positioned on/over

a teat in a close fit

a teat cup liner receiving flexible sleeve (1), adapted to be positioned on/over a teat.

Mills lacks to mention at least a first portion thereof comprises a thermo-plastic elastomers (TPE), especially a thermoplastic vulcanisate (TPV) comprising a thermoplastic continuous phase and a cross-linked rubber discontinuous phase material, exhibiting the following properties: a) a hardness between 25 shore A and 50

Art Unit: 3644

shore D; b) a Young's modulus between 0.1 MPa and 50 MPa; c) a tensile strength above 0.5 MPa; and d) a minimum elongation of 50% without breakage.

Alveby teaches that it is old and well known in the milking art to provide a teat receiving flexible sleeve adapted to be positioned on/over a teat wherein at least a first portion comprises a thermoplastic elastomer (like rubber). It would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the flexible sleeve of Mills so as to include the use of a thermoplastic elastomer material, in a similar manner as taught in Alveby, since using different type material is considered as a matter of design choice depended on its suitability for the intended use and/or the availability of the material.

With respect to the limitation "at least a further portion comprises a TPE material different from that of the first portion" as claimed in claim 6, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the flexible sleeve of Mills as modified by Alveby so as to include a flexible sleeve having different material portions, since using different type material is considered as a matter of design choice depended on its suitability for the intended use and/or the availability of the material, wherein no stated problem is solved or any new or unexpected result achieved, since it appears that the invention would perform equally well with the material used in Mills as modified by Alveby.

With respect to the limitation "a) a hardness between 25 shore A and 50 shore D; b) a Young's modulus between 0.1 MPa and 50 MPa; c) a tensile strength above 0.5 MPa; and d) a minimum elongation of 50% without breakage", it would have been

Art Unit: 3644

obvious to one having ordinary skill in the art at the time the invention was made to have modified the material of Mills as modified by Alveby so as to include the use of a thermo-plastic elastomers (TPE) material exhibiting the properties of hardness between 25 shore A and 50 shore D, a Young's modulus between 0.1 MPa and 50 MPa, a tensile strength above 0.5 MPa, and a minimum elongation of 50% without breakage, since it has been held that where the general conditions of a claim are disclosed in the prior art, discovering the optimum or workable ranges involves only routine skill in the art. Also, since applicant did not provide a reason and/or showing any criticality as to why the thermo-plastic elastomers (TPE) has to specifically exhibited the properties of hardness between 25 shore A and 50 shore D, a Young's modulus between 0.1 MPa and 50 MPa, a tensile strength above 0.5 MPa, and a minimum elongation of 50% without breakage, it is believed that through trial and error during the testing procedure that one comes up with a desirable hardness or Young's modulus or tensile strength or elongation to meet the design criteria for forming a teat receiving flexible sleeve.

For claim 3, as described above, Mills as modified by Alveby disclose most of the claimed invention except for the use of the cross-linked rubber discontinuous phase comprises a butadiene rubber; silicone; EPDM; or NBR optionally grafted with acrylates or anhydrides, or a combination of any or all of these. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the material of Mills as modified by Alveby so as to include the discontinuous phase comprises a butadiene rubber; silicone; EPDM; or NBR optionally grafted with acrylates or anhydrides, or a combination of any or all of these, since using

Art Unit: 3644

another type material is considered as a matter of design choice depended on its suitability for the intended use and/or the availability of the material, wherein no stated problem is solved or any new or unexpected result achieved, since it appears that the invention would perform equally well with the type of material used in Mills as modified by Alveby.

For claim 4, as described above, Mills as modified by Alveby disclose most of the claimed invention except for the use of the cross-linked rubber is selected from the group consisting of nitrile rubber, styrene-butadiene rubber, butyl rubber, halo-butyl rubber, ethylene-propylene rubber, polyisoprene, polychloroprene, polybutene copolymers, and chlorosulfonated polyethylene. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the material of Mills as modified by Alveby so as to include the rubber is selected from the group consisting of nitrile rubber, styrene-butadiene rubber, butyl rubber, halo-butyl rubber, ethylene-propylene rubber, polyisoprene, polychloroprene, polybutene copolymers, and chlorosulfonated polyethylene, since using another type material is considered as a matter of design choice depended on its suitability for the intended use and/or the availability of the material, wherein no stated problem is solved or any new or unexpected result achieved, since it appears that the invention would perform equally well with the type of material used in Mills as modified by Alveby.

For claim 5, as described above, Mills as modified by Alveby disclose most of the claimed invention except for the use of the thermoplastic continuous phase comprises a crystalline polyolefin selected from the group consisting of polyethylene, polypropylene,

Art Unit: 3644

or copolymers, and mixtures thereof. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the material of Mills as modified by Alveby so as to include the continuous phase comprises a crystalline polyolefin selected from the group consisting of polyethylene, polypropylene, or copolymers, and mixtures thereof, since using another type material is considered as a matter of design choice depended on its suitability for the intended use and/or the availability of the material, wherein no stated problem is solved or any new or unexpected result achieved, since it appears that the invention would perform equally well with the type of material used in Mills as modified by Alveby.

For claim 7, as described above, Mills as modified by Alveby disclose most of the claimed invention except for the use a core material and a partial surface coating material. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the material of Mills as modified by Alveby so as to include the use of a core material and a partial surface coating material, since using another type material is considered as a matter of design choice depended on its suitability for the intended use and/or the availability of the material, wherein no stated problem is solved or any new or unexpected result achieved, since it appears that the invention would perform equally well with the type of material used in Mills as modified by Alveby.

For claim 8, as described above, Mills as modified by Alveby disclose most of the claimed invention except for the core material has a $\tan \delta < 0.20$. However, it would have been obvious to one having ordinary skill in the art at the time the invention was

Art Unit: 3644

made to have modified the material of Mills as modified Alveby so as to include the core material has a $\tan \delta < 0.20$, since it has been held that where the general conditions of a claim are disclosed in the prior art, discovering the optimum or workable ranges involves only routine skill in the art.

For claim 9, as described above, Mills as modified by Alveby disclose most of the claimed invention except for the use of the core material is an SBS or SEBS, and the surface coating is an EPDM based TPV or NBR. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the material of Mills as modified by Alveby so as to include the core material is an SBS or SEBS, and the surface coating is an EPDM based TPV or NBR, since using another type material is considered as a matter of design choice depended on its suitability for the intended use and/or the availability of the material, wherein no stated problem is solved or any new or unexpected result achieved, since it appears that the invention would perform equally well with the type of material used in Mills as modified by Alveby.

For claim 10, as described above, Mills as modified by Alveby disclose most of the claimed invention except for the TPE of said further portion is different from the TPE of said first portion in that the TPE of the first portion exhibits a higher stiffness/hardness than the TPE of said further portion. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the material of Mills as modified by Alveby so as to include the TPE of said further portion is different from the TPE of said first portion in that the TPE of the first portion exhibits a

Art Unit: 3644

higher stiffness/hardness than the TPE of said further portion, since using another type material is considered as a matter of design choice depended on its suitability for the intended use and/or the availability of the material, wherein no stated problem is solved or any new or unexpected result achieved, since it appears that the invention would perform equally well with the type of material used in Mills as modified by Alveby.

For claim 11, as described above, Mills as modified by Alveby disclose most of the claimed invention except for the TPE exhibiting a higher stiffness/hardness comprises a hard EPDM based TPV or a hard NBR based TPV, TPU, TPA or TEEE, and the softer part is a soft EPDM based TPV or a soft NBR based TPV. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the material of Mills as modified by Alveby so as to include the material exhibiting a higher stiffness/hardness is a hard EPDM based TPV or a hard NBR based TPV, TPU, TPA or TEEE, and the softer part is a soft EPDM based TPV or a soft NBR based TPV, since using another type material is considered as a matter of design choice depended on its suitability for the intended use and/or the availability of the material, wherein no stated problem is solved or any new or unexpected result achieved, since it appears that the invention would perform equally well with the type of material used in Mills as modified by Alveby.

For claim 12, as described above, Mills as modified by Alveby disclose most of the claimed invention except for a service temperature between -60 and +200°C. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the material of Mills as modified Alveby so as

Art Unit: 3644

to include a service temperature between -60 and +200°C, since it has been held that where the general conditions of a claim are disclosed in the prior art, discovering the optimum or workable ranges involves only routine skill in the art.

For claim 17, as described above, Mills as modified by Alveby disclose most of the claimed invention except for the use of the TPE is resistant to chlorine, ozone and to UV irradiation and thermal oxidation. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the material of Mills as modified by Alveby so as to include the TPE that is resistant to chlorine, ozone and to UV irradiation and thermal oxidation, since using another type material is considered as a matter of design choice depended on its suitability for the intended use and/or the availability of the material, wherein no stated problem is solved or any new or unexpected result achieved, since it appears that the invention would perform equally well with the type of material used in Mills as modified by Alveby.

For claim 18, as described above, Mills as modified by Alveby disclose most of the claimed invention (note that the material in Mills as modified by Alveby is inherently exhibited the property of tear strength therein) except for the TPE exhibits a tear strength between 5 and 50 kN/m. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the material of Mills as modified by Alveby so as to include the TPE exhibits a tear strength between 5 and 50 kN/m, since it has been held that where the general conditions of a claim are disclosed in the prior art, discovering the optimum or workable ranges involves only routine skill in the art.

Art Unit: 3644

For claim 19, as described above, Mills as modified by Alveby disclose most of the claimed invention (note that the material in Mills as modified by Alveby is inherently exhibited the property of tensile strength therein) except for the tensile strength of the TPE is 0.5-40 MPa. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the material of Mills as modified by Alveby so as to include the TPE exhibits a tensile strength of 0.5-40 MPa, since it has been held that where the general conditions of a claim are disclosed in the prior art, discovering the optimum or workable ranges involves only routine skill in the art.

For claim 20, as described above, Mills as modified by Alveby disclose most of the claimed invention (note that the material in Mills as modified by Alveby is inherently exhibited the property of elongation therein) except for the elongation of the TPE is more than 200% before breakage. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the material of Mills as modified Alveby so as to include the elongation of the TPE is more than 200% before breakage, since it has been held that where the general conditions of a claim are disclosed in the prior art, discovering the optimum or workable ranges involves only routine skill in the art.

For claim 22, Mills as modified by Alveby (emphasis on Mills) further disclose a teat cup liner, adapted to be positioned on/over a teat in a close fit, comprising a head portion (2), a sleeve (11) and a milk tube (10) integrated in a unitary structure.

For claim 28, as described above, Mills as modified by Alveby disclose most of the claimed invention except for the use of the polyolefin which is selected from the group consisting of HDPE, LDPE, and LLDPE. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the material of Mills as modified by Alveby so as to include the polyolefin which is selected from the group consisting of HDPE, LDPE, and LLDPE, since using another type material is considered as a matter of design choice depended on its suitability for the intended use and/or the availability of the material, wherein no stated problem is solved or any new or unexpected result achieved, since it appears that the invention would perform equally well with the type of material used in Mills as modified by Alveby.

For claim 29, as described above, Mills as modified by Alveby disclose most of the claimed invention (note that the material in Mills as modified by Alveby is inherently exhibited the property of tear strength therein) except for the TPE exhibits a tear strength between 15-35 kN/m. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the material of Mills as modified by Alveby so as to include the TPE exhibits a tear strength between 15-35kN/m, since it has been held that where the general conditions of a claim are disclosed in the prior art, discovering the optimum or workable ranges involves only routine skill in the art.

For claim 30, as described above, Mills as modified by Alveby disclose most of the claimed invention (note that the material in Mills as modified by Alveby is inherently exhibited the property of tensile strength therein) except for the tensile strength of the

Art Unit: 3644

TPE is 5-20 MPa. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the material of Mills as modified by Alveby so as to include the TPE exhibits a tensile strength of 5-20 MPa, since it has been held that where the general conditions of a claim are disclosed in the prior art, discovering the optimum or workable ranges involves only routine skill in the art.

For claim 31, as described above, Mills as modified by Alveby disclose most of the claimed invention (note that the material in Mills as modified by Alveby is inherently exhibited the property of elongation therein) except for the elongation of the TPE is more than 300% before breakage. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the material of Mills as modified Alveby so as to include the elongation of the TPE is more than 300% before breakage, since it has been held that where the general conditions of a claim are disclosed in the prior art, discovering the optimum or workable ranges involves only routine skill in the art.

Double Patenting

4. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and, *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Art Unit: 3644

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

5. Claims 1,17-23, and 29-31 are provisionally rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 1-15 of copending Application No. 11/597,716. Although the conflicting claims are not identical, they are not patentably distinct from each other because claim 1 (narrower) of the application "anticipates" claim 1 (broader) of the copending Application No. 11/597,716. Accordingly, the application claim 1 are not patentably distinct from the copending Application No. 11/597,716 claim 1, since the application claim 1 requires elements (i.e., "a) a hardness between 25 shore A and 50 shore D; b) a Young's modulus between 0.i MPa and 50 MPa; c) a tensile strength above 0.5 MPa; and d) a minimum elongation of 50% without breakage") while the copending Application No. 11/597,716 claim 1 does not. Thus it is apparent that the more specific application claim 1 encompasses the copending Application No. 11/597,716 claim 1. Following the rationale in *In re Goodman* cited in the preceding paragraph, where applicant has once been filed an application or granted a patent containing a claim for the specific or narrower invention, applicant may not then obtain a second application or patent with a claim for the generic or broader invention without first submitting an appropriate terminal disclaimer.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

Conclusion

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Trinh T. Nguyen whose telephone number is (571) 272-6906. The examiner can normally be reached on M-F (1:30 P.M to 10:00 P.M).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Tim Collins can be reached on (571) 272-6886. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/T. T. N./
Primary Examiner, Art Unit 3644

Office Action Summary	Application No. 10/539,019	Applicant(s) GISSLEGARD ET AL.	
	Examiner Trinh T. Nguyen	Art Unit 3644	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 26 August 2010.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1,3-12,17-22 and 28-31 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1,3-12,17-22 and 28-31 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

Notice of References Cited	Application/Control No. 10/539,019	Applicant(s)/Patent Under Reexamination GISSLEGARD ET AL.	
	Examiner Trinh T. Nguyen	Art Unit 3644	Page 1 of 1

U.S. PATENT DOCUMENTS

*		Document Number Country Code-Number-Kind Code	Date MM-YYYY	Name	Classification
	A	US-			
	B	US-			
	C	US-			
	D	US-			
	E	US-			
	F	US-			
	G	US-			
	H	US-			
	I	US-			
	J	US-			
	K	US-			
	L	US-			
	M	US-			

FOREIGN PATENT DOCUMENTS

*		Document Number Country Code-Number-Kind Code	Date MM-YYYY	Country	Name	Classification
	N					
	O	WO 00/76298	12-2000		Alveby, Nils	
	P					
	Q					
	R					
	S					
	T					

NON-PATENT DOCUMENTS

*		Include as applicable: Author, Title Date, Publisher, Edition or Volume, Pertinent Pages)
	U	
	V	
	W	
	X	

*A copy of this reference is not being furnished with this Office action. (See MPEP § 707.05(a).)
Dates in MM-YYYY format are publication dates. Classifications may be US or foreign.